

LAKE: BISCAY P (VLMP 15)
 TOWN: DAMARISCOTTA
 COUNTY: LINCOLN

MIDAS: 5710
 TRUE BASIN: 1
 SAMPLE STATION: 1

WHOLE LAKE INFORMATION

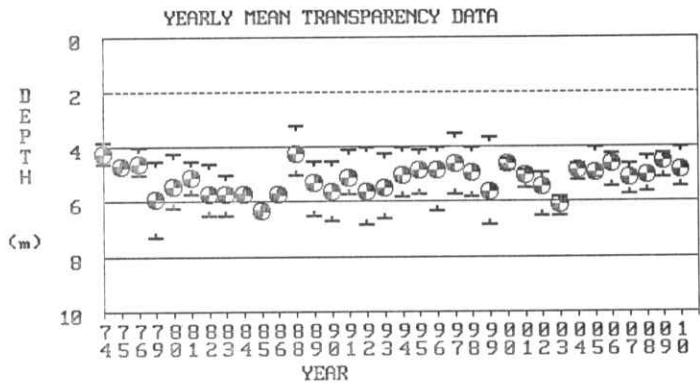
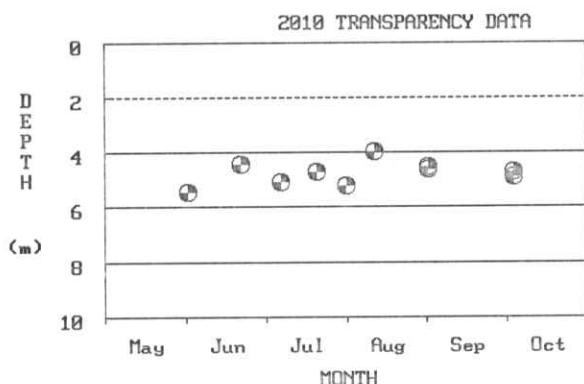
MAX. DEPTH: 19 m. (61 ft.)
 MEAN DEPTH: 12 m. (39 ft.)
 DELORME ATLAS #: 07
 USGS QUAD: WALDOBORO WEST
 IFW REGION B: Belgrade Lakes (Augusta)
 IFW FISH. MANAGMENT: Warmwater & Coldwater

TRUE BASIN CHARACTERISTICS

SURFACE AREA: 145.0 ha. (358.3 a.)
 FLUSHING RATE: 3.12 flushes/yr.
 VOLUME: 14200017.0 cu. m. (11519 ac.-ft.)
 DIRECT DRAINAGE AREA: 10.10 sq. km. (3.90 sq. mi.)

PLEASE NOTE THE FOLLOWING: The SAMPLE STATION # refers to the location sampled. The term TRUE BASIN is used to define areas within a lake that are separated by shallow reefs or shoals and therefore function as separate lakes. There are approximately 50 lakes in the state that have more than 1 True Basin. True Basin Characteristics are now being included in the first section of these reports to enable users of the Phosphorous Loading Methodology to better evaluate the data. If there is no data for a particular True Basin, True Basin Characteristics must be obtained from the DEP. BISCAY P has 1 True Basin(s).

SECCHI DISK TRANSPARENCY GRAPHS:



Note: 2010 graphs may indicate multiple readings taken on a given day.

SUMMARY OF CHEMICAL AND TROPHIC STATE PARAMETERS:

[* indicates that Secchi disk was visible at bottom of lake (or one reading used in calculation was visible)].

YEAR	MEAN COLOR (SPU)	MEAN pH	MEAN ALK (mg/l)	MEAN COND. (uS/cm)	TOTAL PHOS. MEANS (ppb)			SECCHI DISK (m.)			CHLOROPHYLL A(ppb)			TROPHIC STATE INDICES				
					EPI	SURF	BOT.	GRAB	GRAB	GRAB	MIN.	MEAN	MAX.	N	MIN.	MEAN	MAX.	
															C	G	SEC	CHL
1974	-	7.00	28.0	-	-	-	-	-	-	-	3.8	4.2	4.6	2	-	-	-	-
1975	-	-	-	-	-	-	-	-	-	-	4.7	4.7	4.7	1	-	-	-	-
1976	-	6.40	8.0	32	7	-	-	20	13	-	4.0	4.6	5.0	3	1.7	3.0	4.3	-
1979	40	-	-	-	-	-	-	-	-	-	4.5	5.9	7.3	4	-	-	-	-
1980	-	-	-	-	-	-	-	-	-	-	4.2	5.4	6.2	5	-	-	-	44
1981	30	6.60	4.0	32	9	-	-	17	-	-	4.5	5.1	5.7	4	3.9	3.9	3.9	-
1982	-	-	-	-	-	-	-	-	-	-	4.6	5.7	6.5	4	-	-	-	-
1983	40	6.30	6.0	30	-	-	-	-	-	-	5.0	5.7	6.5	5	-	-	-	42
1984	-	-	-	-	-	-	-	-	-	-	5.7	5.7	5.7	1	-	-	-	-
1985	-	-	-	-	-	-	-	-	-	-	6.3	6.3	6.3	1	-	-	-	-
1986	-	-	-	-	-	-	-	-	-	-	5.7	5.7	5.7	1	-	-	-	-
1988	30	6.60	4.0	-	5	-	-	11	-	-	3.2	4.2	5.0	3	-	-	-	-
1989	-	-	-	-	-	-	-	-	-	-	4.5	5.3	6.5	6	-	-	-	45
1990	30	6.50	8.5	41	7	-	-	-	-	-	4.5	5.6	6.7	5	3.2	3.2	3.2	43
1991	-	-	-	-	-	-	-	-	-	-	4.1	5.1	5.7	6	-	-	-	47

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YEAR	MEAN	MEAN	MEAN	MEAN	COND. (uS/cm)	TOTAL PHOS. (ppb)	MEANS (ppb)	SECCHI DISK (m.)			CHLOROPHYLL A(ppb)			TROPHIC STATE INDICES					
	COLOR (SPU)	pH	ALK (mg/l)	EPI				MIN.	MEAN	MAX.	N	MIN.	MEAN	MAX.	EPI	PHOS			
				/cm)	CORE	GRAB	GRAB	GRAB							C	G	SEC	CHL	
1992	-	-	-	-	-	-	-	4.0	5.6	6.8	6	-	-	-	-	-	43	-	
1993	-	-	-	-	-	-	-	4.2	5.5	6.6	6	-	-	-	-	-	43	-	
1994	-	-	-	-	-	-	-	4.0	5.0	5.8	6	-	-	-	-	-	48	-	
1995	-	-	-	-	-	-	-	4.1	4.8	5.7	6	-	-	-	-	-	50	-	
1996	35	-	-	-	-	-	-	4.0	4.8	6.3	6	-	-	-	-	-	50	-	
1997	15	6.90	7.2	44	6	-	12	-	3.5	4.6	5.7	6	5.0	5.0	5.0	-	-	53	-
1998	-	-	-	-	-	-	-	4.0	4.9	5.8	6	-	-	-	-	-	49	-	
1999	-	-	-	-	-	-	-	3.6	5.6	6.8	6	-	-	-	-	-	43	-	
2000	-	-	-	-	-	-	-	4.4	4.6	4.8	6	-	-	-	-	-	53	-	
2001	-	-	-	-	-	-	-	4.8	5.0	5.5	3	-	-	-	-	-	-	-	
2002	22	-	8.0	51	7	-	12	-	4.9	5.4	6.5	4	4.6	5.3	5.9	-	-	-	-
2003	-	-	-	-	-	-	-	5.8	6.1	6.5	3	-	-	-	-	-	-	-	
2004	-	-	-	-	-	-	-	4.6	4.8	5.2	4	-	-	-	-	-	-	-	
2005	-	-	-	-	-	-	-	4.0	4.9	5.1	4	-	-	-	-	-	-	-	
2006	-	-	-	-	-	-	-	4.2	4.6	5.4	5	-	-	-	-	-	53	-	
2007	-	-	-	-	-	7	-	-	4.6	5.1	5.7	3	-	-	-	-	-	-	
2008	19	6.83	5.3	41	6	7	14	-	4.3	5.0	5.6	4	5.1	5.1	5.1	-	-	-	
2009	-	-	-	-	-	-	-	4.2	4.5	5.1	3	-	-	-	-	-	-	-	
2010	-	-	-	-	-	-	-	4.0	4.8	5.4	5	-	-	-	-	-	50	-	
SUMMARY:	29	6.58	8.8	39	7	7	14	13	3.2	5.1	7.3	34	1.7	4.2	5.9	-	-	47	-

LATE SUMMER TEMPERATURE / DISSOLVED OXYGEN PROFILES:

DEPTH m	SAMPLE DATE															
	08/26/02		08/28/03		09/12/03		08/12/06		08/21/07		09/02/08		08/11/10		08/31/10	
	°C	ppm	°C	ppm	°C	ppm	°C	ppm	°C	ppm	°C	ppm	°C	ppm	°C	ppm
0.0	24.3	7.8	23.5	8.3	21.1	8.6	24.0	8.2	22.2	8.2	22.5	8.0	27.0	8.6	25.0	8.3
1.0	24.3	7.7	23.5	8.2	20.9	8.6	24.0	8.2	21.8	8.2	22.5	8.0	26.3	8.5	24.4	8.3
2.0	24.1	7.7	23.5	8.2	20.8	8.6	24.0	8.2	21.7	8.1	22.4	8.1	25.2	8.3	23.4	8.4
3.0	23.6	7.7	23.4	8.2	20.7	8.5	23.9	8.2	21.6	8.0	22.4	8.1	24.2	7.9	22.6	8.2
4.0	23.5	7.6	23.3	8.2	20.7	8.5	23.8	8.2	21.6	8.0	22.4	8.1	23.8	7.5	22.0	7.8
5.0	23.1	6.9	22.3	7.2	20.5	8.2	22.9	7.2	21.3	7.7	22.4	8.1	23.0	6.8	21.6	7.3
6.0	20.7	3.2	19.2	4.5	20.1	7.5	19.6	5.0	15.8	5.2	21.8	6.4	19.6	3.9	21.0	6.7
7.0	18.3	2.0	16.4	3.8	18.2	4.3	15.6	5.0	13.4	5.3	18.7	2.2	16.5	4.1	17.4	3.4
8.0	16.1	1.9	13.2	3.5	14.7	2.7	14.6	5.2	12.2	5.3	16.0	1.1	14.4	4.3	14.6	3.6
9.0	14.6	1.7	11.9	3.3	11.7	2.1	13.3	5.1	10.7	4.7	12.8	1.1	11.7	3.8	12.0	3.1
10.0	13.5	1.1	10.2	3.6	10.3	2.2	12.3	4.9	9.5	4.8	11.0	1.3	10.4	3.7	10.5	3.3
11.0	12.5	1.1	9.3	3.7	9.6	2.4	11.5	4.5	8.9	4.8	9.4	1.6	9.4	3.7	9.4	3.7
12.0	12.0	1.1	9.0	3.6	9.1	2.6	10.8	4.6	8.5	4.6	8.7	2.1	8.8	4.0	8.9	3.2
13.0	11.6	0.9	8.8	3.5	8.8	2.4	10.2	4.4	8.2	4.9	8.3	1.7	8.5	4.0	8.6	3.2
14.0	11.3	0.5	8.8	3.4	8.7	2.3	10.0	4.2	8.1	4.8	8.1	1.6	8.3	3.7	8.4	2.9
15.0	11.2	0.4	8.6	3.1	8.5	1.5	10.0	4.0	8.0	4.8	8.0	1.4	8.3	3.6	8.3	2.8
16.0	11.1	0.2	8.6	3.0	8.5	1.0	9.9	3.8	7.9	4.7	7.9	1.3	8.2	3.3	8.2	2.3
17.0	11.0	0.1	8.5	1.6	-	-	9.8	3.7	7.8	4.0	7.9	1.1	8.1	2.9	8.2	2.2
18.0	-	-	-	-	-	-	-	-	7.8	3.7	7.8	0.7	8.1	2.6	-	-

WATER QUALITY SUMMARY

BISCAY POND, DAMARISCOTTA

MIDAS: 5710, Sample Station # 1

The Maine Department of Environmental Protection (ME-DEP) and the Volunteer Lake Monitoring Program (VLMP) have collaborated in the collection of lake data to evaluate water quality, track algal blooms, and determine water quality trends. This dataset does not include data for bacteria, mercury, or nutrients other than phosphorus.

Water quality monitoring data have been collected from Biscay Pond since 1974. During this period, 8 years of basic chemical information was collected in addition to Secchi Disk Transparencies (SDT). In summary, the water quality of Biscay Pond is considered average based on measures of SDT, total phosphorus (TP), and Chlorophyll-a (Chla). The potential for nuisance algal blooms on Biscay Pond is low.

Water Quality Measures: Biscay Pond is a non-colored lake (average color 29 SPU) with an average SDT of 5.2 m (17 ft). The range of water column TP for Biscay Pond is 5 - 9 parts per billion (ppb) with an average of 7 ppb. Chla ranges from 1.7 - 5.9 ppb with an average of 4.2 ppb. Recent dissolved oxygen (DO) profiles show slight to moderate DO depletion in deep areas of the lake. The potential for phosphorus to leave the bottom sediments and become available to algae in the water column (internal loading) is low to moderate. Oxygen levels below 5 parts per million stress certain cold water fish and a persistent loss of oxygen may eliminate or reduce habitat for sensitive cold water species.

The Maine Department of Inland Fisheries and Wildlife (MDIFW) manages Biscay Pond for both warm and cold water fish species.

See ME-DEP Explanation of Lake Water Quality Monitoring Report for measured variable explanations. Additional lake information can be found on the Internet at <http://www.lakesofmaine.org/> and/or <http://www.maine.gov/dep/blwq/lake.htm>, or telephone the ME-DEP at 207-287-3901 or the VLMP at 207-783-7733.

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